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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/805,016	03/19/2004	King Chung	15353US02	7796
23446 7590 11/14/2008 MCANDREWS HELD & MALLOY, LTD 500 WEST MADISON STREET SUITE 3400 CHICAGO, IL 60661				
EXAMINER				
BOCKELMAN, MARK				
ART UNIT		PAPER NUMBER		
3766				
MAIL DATE		DELIVERY MODE		
11/14/2008		PAPER		

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary

Application No.

10/805,016

Applicant(s)

CHUNG ET AL.

Examiner

Mark W. Bockelman

Art Unit

3766

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 18 August 2008.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-24 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-24 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-946)
- 3) ☐ Information Disclosure Statement(s) (PTO/SF/ICE)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date _____
- 5) ☐ Notice of Informal Patent Application
- 6) ☐ Other: _____

DETAILED ACTION

Election/Restrictions

Claims 25-31 are withdrawn (canceled?) from further consideration pursuant to 37 CFR 1.142(b), as being drawn to a nonelected invention, there being no allowable generic or linking claim. Applicant timely traversed the restriction (election) requirement in the reply filed on 1-25-2008 but appears to have canceled the non-elected claims since the amendment cancels all text associated with the claims and merely has "(withdrawn)" in their place.

Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 1-3, 5, 9-11, 13-14, 17-24 are rejected under 35 U.S.C. 102(e) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Miller 6,620,094.

Miller teaches a system that enhances the performance of an implantable hearing aid which may be an electrical stimulator (column 1, lines 35-40). Miller considers "hearing aids" to include cochlear implants. This is clear from the background of the invention at column 1, lines 35-40) since electrical stimulators are only used in

cochlear implants because that is the only place that electrical stimulation is performed to enhance hearing. Furthermore, in figures 1 and 2 Miller demonstrates the basic components of semi-implantable and fully implantable hearing aid systems, the types of systems used by applicant. In figure 1 Miller again teaches the transducer to be mechanical, electrical or acoustical (column 2 lines 60-64). Furthermore, with respect to the transducer 203, "The transducer 203 is implanted within the middle ear cavity or cochlea as a function of the implant type." The examiner considers it inherent or otherwise obvious that the use of the word "transducer" as used in Miller's various embodiments, is intended to cover mechanical, acoustic as well as implanted cochlear electrical stimulators.

With respect to figure 3, the examiner considers the input devices to comprise omnidirectional microphone 312, acoustic source 107, wireless (directional microphone 304) and wireless source 305 (telecoil). A second processor in the form of a speech processor is shown at 311. Interface system 301 may contain its own circuitry and software to provide input source selection by masking out various sources and thus selecting the strongest input mode and extracting out the best signal fed into the processor. See column 6 line 50 to column 7 line 24. The examiner considers this embodiment to constitute an automatic switching of sources or modes of operation. In addition, user selected switching may be used. Applicant provides no details as to their means for switching and thus the examiner considers such to be inherent to Miller or at least obvious. Both processors are depicted as housed in the same case 306 as well as omnidirection microphone with input devices 108, 313 and 305 in another case.

Regarding claims 21 and 23, one can pick and select components within the first processor unit such as the input lines and consider them part of the second processor with the remaining circuitry as part of the second processor. The limitation merely provides for labeling components any way you wish. For claim 24, embodiment 5 shows a volume control (eg. amplification device positioned after the mode selection circuit. To have included amplification as part of the second processor is inherent or otherwise obvious. To have placed the signal processors on the same chip would have been obvious.

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 4, 6-8, 12, 15-16 are rejected under 35 U.S.C. 103(a) as being unpatentable over Miller 6,620,094 alone or in view of Griffith et al. USPN 6,842,647.

To have placed the signal processors on the same chip would have been obvious to ease manufacturing. Providing impedance matching between interface system 301 of Miller and the speech processor would be a notoriously old and well know to prevent unwanted reflections. Alternatively, to have modified Miller so as to provide an implanted speech processor within implantable portion 306 of Miller and provided an impedance matching circuit between the interface unit and the implant

device would have been an obvious improvement as a well known alternative demonstrated by Griffith et al USPN 6,842,647.

Response to Arguments

Applicant's arguments filed 8-18-2008 have been fully considered but they are not persuasive. Applicant seems to challenge the examiner's interpretation of the Miller reference on two points. First, applicant argues that Miller never teaches a cochlear implant as part of his hearing aid embodiments and particularly to that of figure 3. The examiner disagrees and has offered better explanation in the body of the rejection as stated above as to why one of ordinary skill in the art would read the transducer 309 to include a cochlear implant. Miller provides background information that clearly suggests that the transducer elements in all of the disclosed embodiments and particularly to figure 3 can be electrical stimulators implanted in the cochlea. If applicants are aware of any electrical stimulators that are implantable in the auditory system and that stimulate hearing anywhere else but the cochlea and consistent with the Miller disclosure, they should make the examiner aware of such information.

Secondly, applicant's contesting of the automatic-switching interpretation of Miller seems to argue just the opposite of Miller's cochlea implant teaching. Applicants' specification concerning their own specific embodiment mentions nothing about automatic switching, but merely discusses conventional hearing aids. It is noted that the claims as originally filed also do not include claims directed automatic switching. Instead applicant apparently has relied upon background teachings (see applicants' paragraph [0006]) to support the claims as now filed. Because the background section teaches

what some conventional hearing aids were known to possess the examiner has considered this to be part of applicant's invention when they refer to hearing aids in the new material being disclosed much like he has considered the background information in Miller to be part of the invention. If applicant insists that the examiner cannot do such for Miller, the examiner may be required to reconsider the support for applicants' claims as now pending in view of their original disclosure. The examiner concludes from the reading of applicants' [0006] paragraph, that a broad interpretation may be applied since no details are provided regarding the automatic switching. Automatic-switching, does not necessarily require a "switch" per se, but can also be interpreted as automatic changing. The Miller device provides automatic changing of either source by masking, or the mode (that which does the masking by hierarchy selection). Applicants' disclosure provides no stricter interpretation of the term and the examiner considers the interpretation as applied to Miller above to be within broadest interpretation of the normal meaning of the words as claimed.

Conclusion

THIS ACTION IS MADE FINAL. Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any

extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Mark W. Bockelman whose telephone number is (571) 272-4941. The examiner can normally be reached on Monday - Friday 8:00 - 4:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Carl Layno can be reached on (571) 272 -4949. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

/Mark W Bockelman/
Primary Examiner, Art Unit 3766
November 9, 2008